Data Analysis Notes

* **What are the 2 types of data?**
  + **\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**: numbers, measurements
  + **\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**: descriptive, words
* **Examples**
  + A drawing of your M&M dissolving.
    - \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
  + Timing how fast your M&M dissolves
    - \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
* **How do you organize your data?**
  + \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
  + \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
* **Why do you use charts/tables and graphs?**
  + To help \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_your data
  + To help \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ in your data
  + To help present \_\_\_\_\_\_\_\_\_\_\_\_\_\_ to \_\_\_\_\_\_\_\_\_\_\_\_\_or \_\_\_\_\_\_\_\_\_\_\_ your hypothesis
* **Rules of Charts/Tables**
  + \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ each column and row
  + Give the chart/table a \_\_\_\_\_\_\_\_\_\_\_\_\_\_
  + Always include \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_in the chart/table
* **Example**

Type of Candy and Dissolving Time in Water

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Type of Candy** | **Dissolving time for Trial 1** | **Dissolving time for Trial 2** | **Dissolving time for trial 3** | **Average** |
| M&M | 60 sec | 65 sec | 55 sec | 60 sec |
| Peanut M&M | 65 sec | 65 sec | 65 sec | 65s ec |

* **Types of Graphs**
  + Bar graph: use for \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
  + Line graph: use to show a \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
  + Pie graph: use to show \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_
* **Graphing Checklist**
  + Give your graph a \_\_\_\_\_\_\_\_\_\_\_
  + Choose the correct \_\_\_\_\_\_\_\_of graph
  + Label both your\_\_\_\_\_\_\_\_\_\_
  + Put the \_\_\_\_\_\_\_\_\_on each axes.
  + Identify the \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_and \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_variable.
  + Choose an appropriate \_\_\_\_\_\_\_\_\_\_\_for your axes.
  + Include a \_\_\_\_\_\_\_\_if needed.
* **Examples**
  1. Which type of graph would you use to show the change in temperature over a month for a city?

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* 1. Which type of graph would you use to show the number of students who like each type of pop?

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* 1. Which type of graph would you use to show the percentage of students who earn each letter grade on the last test?

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